NOTES AND NEWS.

PROFESSOR HUGO LOJKA, a Hungarian lichenologist, died at Budapest September 7.

B. T. Galloway, of Missouri, has been appointed assistant in the my-cological section of the Department of Agriculture at Washington.

D. Brandis (in Nature) says that the principal garden roses cultivated in Europe and in India may be traced to Western Asia and China.

PROF. WILLIAM R. DUDLEY, after traveling through parts of Germany and Switzerland, has begun his studies for the winter in De Bary's laboratory at Strassburg.

Dr. Vasey's report for 1886, as botanist to the Department of Agriculture, has been distributed in the form of an author's edition, consisting of 27 pages of text and 21 plates.

EDWARD L. GREENE, in Torrey Bulletin, says that Nelumbo of Baillon has precedence over Nelumbium of Willdenow, and that Nelumbium luteum should be Nelumbo lutea Baillon.

The Government of Jamaica offers a prize of £100 for the best practical elementary text-book of tropical agriculture. Manuscripts are to be sent to the Government of Jamaica on or before August 1, 1888.

In Journal of Botany for October, Arthur Bennett describes a new Potamogeton from Mexico (P. Mexicanus), and incidentally remarks that P. Claytonii Tuck. should undoubtedly be P. Pennsylvanicus Willd.

DR. E. LEWIS STURTEVANT resigns his position as director of the New York Agricultural Experiment Station at the close of the year, and will be succeeded by Mr. Peter Collier, well known for his work on sorghum sugar.

A PAPER of over two hundred determinations of fossil plants, including some new species, by Leo Lesquereux, prepared for publication by F. H. Knowlton, has been distributed as an excerpt of the *Proceedings U. S. National Museum*.

Dr. Gray and wife have returned from their six months absence in Europe in good health and spirits. The results of this visit will appear in the sadly-needed and long-looked-for volume on North American Polypetalæ.

In Bulletin of the Torrey Botanical Club for October, Dr. T. F. Allen describes several new Characeæ (with five plates), two of which belong to this country, viz.: Tolypella Macounii from Niagara Falls, and Nitella Morongii from Nantucket.

Cooke's British Desmids, which has been issuing in parts, is now completed. It contains 370 species, which is 160 less than recorded by Mr. Wolle for the United States. The bound volume is sold for two and a half guineas, about \$13.12½. It is illustrated with sixty-six colored plates.

In their study of North American Umbelliferæ Professor Coulter and Mr. Rose desire to examine collections from all parts of the country. Many of the species, as shown by our best herbaria, are greatly confused in naming. They offer to name and return any collection of Umbellifers from North America, and attention is called to the fact that good fruiting specimens are usually necessary for accurate determination.

WILL THRELFALL is at work upon the gentians, and has asked American botanists to assist him in procuring plants, seeds, or dried specimens of our species. He offers to exchange or purchase, and will send a list of desiderata upon application. His address is Hollowforth near Preston, Lancashire, England.

Word as late as July 29 has been received from Dr. G. M. Dawson's party exploring the Yukon district. Only the great growth of sphagnous mosses and the abundance of reindeer moss give the country a different appearance from that of British Columbia. They speak of sometimes struggling through tangled woods knee-deep in moss.

RECENT WRITINGS on the root swellings and their bacteria-like contents in the Leguminosæ and other plants are reviewed through eight pages of the Botanisches Centralblatt (Bd. 31, Nos. 10 and 11) by Dr. Paul Sorauer. No reference is made to articles in English, although such have been published both in England and this country.

A DISTRIBUTION of rust exsiccati will shortly be begun under the title, Sydow Uredineen, to contain the different stages, æcidium, uredo, teleutosporic, and the forms upon all the different host plants. It will appear in fascicles of fifty numbers, at nine marks each. Address P. Sydow, Schoeneberg bei Berlin, Goltzstrasse 3, Germany.

Bujwid, in Zeitschrift für Hygiene, claims the discovery of a chemical test for the detection of the cholera bacillus. To bouillon-cultures ten to twelve hours old, and gelatine-cultures after twenty-four hours, 5 to 10 per cent. of ordinary muriatic acid is added. In a few minutes a rose-violet color appears, which increases in intensity for half an hour.

In the American Naturalist for October, Dr. Bessey extends the range of several well known trees. Pinus ponderosa, var. scopulorum Eng., he found as far east as the 100th meridian, along the bluffs of the Niobrara river. Along with it grows Juglans nigra L., whose range is thus extended westward to the 100th meridian. Ostrya Virginica was also observed along the Niobrara river and in the Black Hills of Dakota.

The tomato disease called "black spot," caused by Cladosporium Lycopersici Plowright, seems to have become very virulent in England. The Gardeners' Chronicle for October 1 figures and describes it. The fungus seems first to attack the decayed remains of the style while the fruits are small and green, and thus gains access. The remarkable flattening of the apex of the fruit is one of the peculiarities of the disease.

The herbarium of H. H. Babcock, who published a well prepared list of the plants of Chicago and vicinity some fifteen years ago, was recently presented to the Northwestern University at Evanston, Ill., by his widow. It contains over 10,000 species. The herbarium of E. R. Brownell, of Hartford, Conn., deceased, containing about 2,500 species, with unnamed specimens from Cuba, has been presented to Brown University at Providence, R. I.

In American Garden, Prof. L. H. Bailey, Jr., discusses the question of acclimatization. The term he restricts to the operations of man in habituating a species to a climate at first injurious. The discussion is a very interesting one, and is divided into two heads: 1. Acclimatization through a change in the individual plant; 2. Through a variation in offspring. Under each head the modification or variation in constitution and habit are separately considered.

THE THIRD REPORT, to cover the year 1885, on diseases of hyacinths and other bulbous and tuberous plants, by Dr. J. H. Wakker, has recently been distributed. Dr. Wakker was employed by the General Union of Bulb Culturists of Holland to investigate for three years (1883, 1884, 1885) the diseases of flowering bulbs, and his three reports, the last much delayed in the printing, contain valuable information based upon

careful research. They are written in the Dutch language.

DRUGS AND MEDICINES of North America, for June, has recently been distributed, containing the concluding part of the account of Erechthites hieracifolia, and most of that of Caulophyllum thalictroides, both plants of much therapeutic value. Upon the completion of the present volume, three or four more parts, the publishers will no longer issue it as a periodical but in completed volumes. This change is necessitated by the numerous protracted investigations on which the work is based, and which give it its special value, but which can not be invariably brought to an end at stated intervals.

THE UNIVERSITY at Graz, Austria, is to have a botanic garden, the sum of \$23,000 having been appropriated for that purpose. The Botanisches Centralblatt points out the absurdity, from the European point of view, of expecting satisfactory results with this amount of money, as the garden at Leipzig cost \$125,000, and that at Strassburg about the same. It will permit the erection of a small garden house and a green-house, but there can be no lecture rooms, no offices and rooms for investigators and no place for students, although the latter are now recognized as a

necessary adjunct to a well-ordered botanic garden.

FRIEDRICH T. KUETZING, the learned algologist, will complete his eightieth year on the 8th of December next. He was one of the first to recognize that for the investigation of the cell and its life the simplest plants, such as are found among algae, are the most serviceable. He made many profound researches, and his systematic works on the algae of Europe are still standard. It is proposed to offer him on his eightieth birthday some mark of public recognition and gratitude for his eminent services as a naturalist. The committee having the matter in charge consists of Messrs. Ascherson, De Bary, Berthold, Cohn, Cramer, Eberstein, Haussknecht, Kny, Leitgeb, Magnus, Müller, Pfitzer, Pringsheim, Reinke, A. Schmidt, Schwendener, Solms-Laubach, Stahl, and Strasburger, mostly well known names to American botanists. Contributions should be sent at once to Otto Müller, Berlin, W., Köthenerstr. 44.

THE Kew Bulletin for October contains an account (with two plates) of the onion disease at Bermuda, caused by Peronospora Schleideniana De Bary. Observations were undertaken by Mr. Arthur Shipley, under the auspices of the Royal Gardens. The favoring atmospheric conditions are heavy dews or rains, followed by warm, moist, calm weather, and the absence of direct sunshine and cold winds. The life history of the fungus is well known to botanists, with its internal parasitism in the leaves, its conidial branches protruded through the stomata, and its reproduction by asexual and sexual spores. It is suggested that onion plants should be made as strong as possible to resist attack, and, to prevent spreading, all affected plants should be collected and burned. Diseased plants may be treated with a mixture of with a mixture of powdered sulphur and freshly burnt quick-lime, or sprayed with a weak solution of iron sulphate. In both cases the fungus is destroyed without injuring the plant.